

1609

1647

RECEIVED

JUL 31 2001

TECH CENTER 1600/2900

DATE: 05/31/2001  
TIME: 11:26:52

AUG 3 0 2001

RECEIVED  
OICE

RECEIVED

SEP 0 3 2001

TECH CENTER 1600/2900

ENTERED

RECEIVED  
SEP - 4 2001  
OICE/JCWS

**RAW SEQUENCE LISTING**

PATENT APPLICATION: US/09/718,725

Input Set : C:\PAOLA\09718725.txt  
Output Set: C:\CRF3\05312001\I718725.raw

**SEQUENCE LISTING**

(1) GENERAL INFORMATION:

(i) APPLICANT: Boyle, William J.  
Lacey, David L.  
Calzone, Frank J.  
Chang, Ming-Shi

(ii) TITLE OF INVENTION: OSTEOPROTEGERIN

(iii) NUMBER OF SEQUENCES: 168

(iv) CORRESPONDENCE ADDRESS:

(A) ADDRESSEE: Amgen Inc.  
(B) STREET: 1840 Dehavilland Drive  
(C) CITY: Thousand Oaks  
(D) STATE: California  
(E) COUNTRY: United States  
(F) ZIP: 91320

(v) COMPUTER READABLE FORM:

(A) MEDIUM TYPE: Floppy disk  
(B) COMPUTER: IBM PC compatible  
(C) OPERATING SYSTEM: PC-DOS/MS-DOS  
(D) SOFTWARE: PatentIn Release #1.0, Version #1.30

(vi) CURRENT APPLICATION DATA:

(A) APPLICATION NUMBER: US/09/718,725  
(B) FILING DATE: 22-Nov-2000  
(C) CLASSIFICATION:

(vii) PRIOR APPLICATION DATA:

(A) APPLICATION NUMBER: 09/132,985  
(B) FILING DATE:

(viii) ATTORNEY/AGENT INFORMATION:

(A) NAME: Winter, Robert B.  
(C) REFERENCE/DOCKET NUMBER: A-378-CIP

(2) INFORMATION FOR SEQ ID NO: 1:

(i) SEQUENCE CHARACTERISTICS:

(A) LENGTH: 36 base pairs  
(B) TYPE: nucleic acid  
(C) STRANDEDNESS: single  
(D) TOPOLOGY: linear

(ii) MOLECULE TYPE: cDNA

(xi) SEQUENCE DESCRIPTION: SEQ ID NO: 1:

AAAGGAAGGA AAAAAGCGGC CGCTACANNN NNNNNT

(2) INFORMATION FOR SEQ ID NO: 2:

(i) SEQUENCE CHARACTERISTICS:

(A) LENGTH: 16 base pairs  
(B) TYPE: nucleic acid  
(C) STRANDEDNESS: single  
(D) TOPOLOGY: linear

(ii) MOLECULE TYPE: cDNA

(xi) SEQUENCE DESCRIPTION: SEQ ID NO: 2:

36

## RAW SEQUENCE LISTING

PATENT APPLICATION: US/09/718,725

DATE: 05/31/2001

TIME: 11:26:52

Input Set : C:\PAOLA\09718725.txt

Output Set: C:\CRF3\05312001\I718725.raw

16

RECEIVED

SEP 05 2001

TECH CENTER 1600/2900

12

18

18

20

23

75 TCGACCCACG CGTCCG

77 (2) INFORMATION FOR SEQ ID NO: 3:

79 (i) SEQUENCE CHARACTERISTICS:

80 (A) LENGTH: 12 base pairs

81 (B) TYPE: nucleic acid

82 (C) STRANDEDNESS: single

83 (D) TOPOLOGY: linear

85 (ii) MOLECULE TYPE: cDNA

90 (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 3:

92 GGGTGCGCAG GC

94 (2) INFORMATION FOR SEQ ID NO: 4:

96 (i) SEQUENCE CHARACTERISTICS:

97 (A) LENGTH: 18 base pairs

98 (B) TYPE: nucleic acid

99 (C) STRANDEDNESS: single

100 (D) TOPOLOGY: linear

102 (ii) MOLECULE TYPE: cDNA

107 (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 4:

109 TGTAACACGA CGGCCAGT

111 (2) INFORMATION FOR SEQ ID NO: 5:

113 (i) SEQUENCE CHARACTERISTICS:

114 (A) LENGTH: 18 base pairs

115 (B) TYPE: nucleic acid

116 (C) STRANDEDNESS: single

117 (D) TOPOLOGY: linear

119 (ii) MOLECULE TYPE: cDNA

124 (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 5:

126 CAGGAAACAG CTATGACC

128 (2) INFORMATION FOR SEQ ID NO: 6:

130 (i) SEQUENCE CHARACTERISTICS:

131 (A) LENGTH: 20 base pairs

132 (B) TYPE: nucleic acid

133 (C) STRANDEDNESS: single

134 (D) TOPOLOGY: linear

136 (ii) MOLECULE TYPE: cDNA

141 (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 6:

143 CAATTAACCC TACTAAAGG

145 (2) INFORMATION FOR SEQ ID NO: 7:

147 (i) SEQUENCE CHARACTERISTICS:

148 (A) LENGTH: 23 base pairs

149 (B) TYPE: nucleic acid

150 (C) STRANDEDNESS: single

151 (D) TOPOLOGY: linear

153 (ii) MOLECULE TYPE: cDNA

158 (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 7:

160 GCATTATGAC CCAGAAACCG GAC

162 (2) INFORMATION FOR SEQ ID NO: 8:

164 (i) SEQUENCE CHARACTERISTICS:

165 (A) LENGTH: 23 base pairs

## RAW SEQUENCE LISTING

PATENT APPLICATION: US/09/718,725

DATE: 05/31/2001

TIME: 11:26:52

Input Set : C:\PAOLA\09718725.txt

Output Set: C:\CRF3\05312001\I718725.raw

```

166          (B) TYPE: nucleic acid
167          (C) STRANDEDNESS: single
168          (D) TOPOLOGY: linear
170      (ii) MOLECULE TYPE: cDNA
175      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 8:
177 AGGTAGCGCC CTCCTCACA TTC                                23
179 (2) INFORMATION FOR SEQ ID NO: 9:
181      (i) SEQUENCE CHARACTERISTICS:
182          (A) LENGTH: 30 base pairs
183          (B) TYPE: nucleic acid
184          (C) STRANDEDNESS: single
185          (D) TOPOLOGY: linear
187      (ii) MOLECULE TYPE: cDNA
192      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 9:
194 GACTAGTCCC ACAATGAACA AGTGGCTGTG                                30
196 (2) INFORMATION FOR SEQ ID NO: 10:
198      (i) SEQUENCE CHARACTERISTICS:
199          (A) LENGTH: 45 base pairs
200          (B) TYPE: nucleic acid
201          (C) STRANDEDNESS: single
202          (D) TOPOLOGY: linear
204      (ii) MOLECULE TYPE: cDNA
209      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 10:
211 ATAAGAATGC GGCCGCTAAA CTATGAAACA GCCCAGTGAC CATTC            45
213 (2) INFORMATION FOR SEQ ID NO: 11:
215      (i) SEQUENCE CHARACTERISTICS:
216          (A) LENGTH: 21 base pairs
217          (B) TYPE: nucleic acid
218          (C) STRANDEDNESS: single
219          (D) TOPOLOGY: linear
221      (ii) MOLECULE TYPE: cDNA
226      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 11:
228 GCCTCTAGAA AGAGCTGGGA C                                    21
230 (2) INFORMATION FOR SEQ ID NO: 12:
232      (i) SEQUENCE CHARACTERISTICS:
233          (A) LENGTH: 21 base pairs
234          (B) TYPE: nucleic acid
235          (C) STRANDEDNESS: single
236          (D) TOPOLOGY: linear
238      (ii) MOLECULE TYPE: cDNA
243      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 12:
245 CGCCGTGTTT CATTTATGAG C                                    21
247 (2) INFORMATION FOR SEQ ID NO: 13:
249      (i) SEQUENCE CHARACTERISTICS:
250          (A) LENGTH: 24 base pairs
251          (B) TYPE: nucleic acid
252          (C) STRANDEDNESS: single
253          (D) TOPOLOGY: linear
255      (ii) MOLECULE TYPE: cDNA

```

RAW SEQUENCE LISTING  
 PATENT APPLICATION: US/09/718,725

DATE: 05/31/2001  
 TIME: 11:26:52

Input Set : C:\PAOLA\09718725.txt  
 Output Set: C:\CRF3\05312001\I718725.raw

```

260      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 13:
262 ATCAAAGGCA GGGCATACTT CCTG                                     24
264 (2) INFORMATION FOR SEQ ID NO: 14:
266      (i) SEQUENCE CHARACTERISTICS:
267          (A) LENGTH: 24 base pairs
268          (B) TYPE: nucleic acid
269          (C) STRANDEDNESS: single
270          (D) TOPOLOGY: linear
272      (ii) MOLECULE TYPE: cDNA
277      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 14:
279 GTTGCACTCC TGTTTCACGG TCTG                                     24
281 (2) INFORMATION FOR SEQ ID NO: 15:
283      (i) SEQUENCE CHARACTERISTICS:
284          (A) LENGTH: 24 base pairs
285          (B) TYPE: nucleic acid
286          (C) STRANDEDNESS: single
287          (D) TOPOLOGY: linear
289      (ii) MOLECULE TYPE: cDNA
294      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 15:
296 CAAGACACCT TGAAGGGCCT GATG                                     24
298 (2) INFORMATION FOR SEQ ID NO: 16:
300      (i) SEQUENCE CHARACTERISTICS:
301          (A) LENGTH: 24 base pairs
302          (B) TYPE: nucleic acid
303          (C) STRANDEDNESS: single
304          (D) TOPOLOGY: linear
306      (ii) MOLECULE TYPE: cDNA
311      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 16:
313 TAACTTTTAC AGAAGAGCAT CAGC                                     24
315 (2) INFORMATION FOR SEQ ID NO: 17:
317      (i) SEQUENCE CHARACTERISTICS:
318          (A) LENGTH: 33 base pairs
319          (B) TYPE: nucleic acid
320          (C) STRANDEDNESS: single
321          (D) TOPOLOGY: linear
323      (ii) MOLECULE TYPE: cDNA
328      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 17:
330 AGCGCGGCCG CATGAACAAG TGGCTGTGCT GCG                         33
332 (2) INFORMATION FOR SEQ ID NO: 18:
334      (i) SEQUENCE CHARACTERISTICS:
335          (A) LENGTH: 31 base pairs
336          (B) TYPE: nucleic acid
337          (C) STRANDEDNESS: single
338          (D) TOPOLOGY: linear
340      (ii) MOLECULE TYPE: cDNA
345      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 18:
347 AGCTCTAGAG AAACAGCCCA GTGACCATTC C                           31
349 (2) INFORMATION FOR SEQ ID NO: 19:
351      (i) SEQUENCE CHARACTERISTICS:

```

## RAW SEQUENCE LISTING

PATENT APPLICATION: US/09/718,725

DATE: 05/31/2001

TIME: 11:26:52

Input Set : C:\PAOLA\09718725.txt

Output Set: C:\CRF3\05312001\I718725.raw

```

352      (A) LENGTH: 24 base pairs
353      (B) TYPE: nucleic acid
354      (C) STRANDEDNESS: single
355      (D) TOPOLOGY: linear
357      (ii) MOLECULE TYPE: cDNA
362      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 19:
364 GTGAAGCTGT GCAAGAACCT GATG                                     24
366 (2) INFORMATION FOR SEQ ID NO: 20:
368      (i) SEQUENCE CHARACTERISTICS:
369          (A) LENGTH: 24 base pairs
370          (B) TYPE: nucleic acid
371          (C) STRANDEDNESS: single
372          (D) TOPOLOGY: linear
374      (ii) MOLECULE TYPE: cDNA
379      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 20:
381 ATCAAAGGCA GGCATACTT CCTG                                     24
383 (2) INFORMATION FOR SEQ ID NO: 21:
385      (i) SEQUENCE CHARACTERISTICS:
386          (A) LENGTH: 24 base pairs
387          (B) TYPE: nucleic acid
388          (C) STRANDEDNESS: single
389          (D) TOPOLOGY: linear
391      (ii) MOLECULE TYPE: cDNA
396      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 21:
398 CAGATCCTGA AGCTGCTCAG TTG                                     24
400 (2) INFORMATION FOR SEQ ID NO: 22:
402      (i) SEQUENCE CHARACTERISTICS:
403          (A) LENGTH: 33 base pairs
404          (B) TYPE: nucleic acid
405          (C) STRANDEDNESS: single
406          (D) TOPOLOGY: linear
408      (ii) MOLECULE TYPE: cDNA
413      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 22:
415 AGCGCGGCCG CGGGGACCAC AATGAACAAG TTG                         33
417 (2) INFORMATION FOR SEQ ID NO: 23:
419      (i) SEQUENCE CHARACTERISTICS:
420          (A) LENGTH: 33 base pairs
421          (B) TYPE: nucleic acid
422          (C) STRANDEDNESS: single
423          (D) TOPOLOGY: linear
425      (ii) MOLECULE TYPE: cDNA
430      (xi) SEQUENCE DESCRIPTION: SEQ ID NO: 23:
432 AGCTCTAGAA TTGTGAGGAA ACAGCTCAAT GGC                         33
434 (2) INFORMATION FOR SEQ ID NO: 24:
436      (i) SEQUENCE CHARACTERISTICS:
437          (A) LENGTH: 39 base pairs
438          (B) TYPE: nucleic acid
439          (C) STRANDEDNESS: single
440          (D) TOPOLOGY: linear

```

VERIFICATION SUMMARY

PATENT APPLICATION: US/09/718,725

DATE: 05/31/2001

TIME: 11:26:53

Input Set : C:\PAOLA\09718725.txt

Output Set: C:\CRF3\05312001\I718725.raw

L:30 M:220 C: Keyword misspelled or invalid format, [(A) APPLICATION NUMBER:]

L:31 M:220 C: Keyword misspelled or invalid format, [(B) FILING DATE:]